Upper East Fork Poplar Creek Watershed

Is it safe?

The Upper East Fork Poplar Creek watershed area, at the Y-12 National Security Complex, is safe for the intended National Nuclear Security Agency's production and storage operations. The eastern end of the watershed has a few locations accessible to the public, such as the New Hope Center, but most of the watershed is restricted to the public due to security reasons.

Are there use limitations that the Public should be aware of?

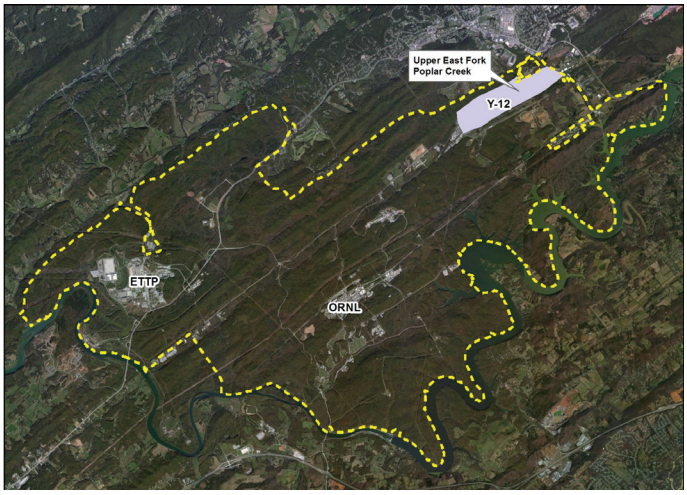
- The public is not allowed to travel west on Bear Creek Road along the northern side of the Y-12 Complex from the residential and business areas of the city of Oak Ridge. Entrance into the plant site is limited to DOE staff and contractor employees with the appropriate DOE badges. Both the East and West Bear Creek Road have guard stations and barriers to control public access. Sponsored visitor badges can be obtained on special occasions when DOE provides bus tours of the site.

- Upper East Fork Poplar Creek waters from the Y-12 Complex entering into the business and residential areas of the city contain mercury contamination exceeding the Clean Water Act established limits for Mercury. Use restrictions for the Lower East Fork Poplar Creek waters and biological species are posted by the state and use-controls are maintained by DOE consistent with the approved Record of Decision (ROD) and Remedial Action Report.

- All controls required for this are are performed under the direction of DOE.

Background:

Operational activities performed at Y-12, involving uranium processing and storage since the early 1940s, contributed to the contamination of the soils, surface water and groundwater at this site. Because of the extensive use of mercury in these operations, there have been significant releases of this element to the environment.



How was the problem addressed?

Due to the movement of water from Y-12 operations, the mercury contamination to the groundwater and the surface waters is one of the EM program's highest priorities. There have been several activities performed in the eastern section of the Upper East Fork Poplar Creek at Y-12 to address environmental issues. In the early 2000's, two RODs were approved. The initial ROD signed for the Upper East Fork Poplar Creek watershed addresses some of the specific mercury abatement needs and the removal of the Y-12 scrap yard. The second ROD included characterizing the site and determining and performing contamination source controls and soil remediation.

The construction of a mercury water treatment facility is planned for construction at a location near the mercury contamination that prevents offsite migration. After construction is complete, work will begin at the western end of the Y-12 complex to demolish obsolete and deteriorating buildings. This work will create better access to the areas with the largest mercury volumes.

A final ROD is necessary following the soils and source control efforts to address the remaining ecological issues, surface water, and groundwater at the Y-12 National Security Complex.

More Information is available:

- *Record of Decision for Phase I Interim Source Control Actions in the Upper East Fork Poplar Creek Characterization Area, Oak Ridge, Tennessee*. May 2, 2002.
- *Record of Decision for Phase II Interim Remedial Actions for Contaminated Soils and Scrapyard in the Upper East Fork Poplar Creek Characterization Area, Oak Ridge, Tennessee*. April 21, 2006.
- Administrative Record – a listing of all available documents and correspondence in reaching this decision is available at the DOE Information Center in Oak Ridge.